

TWENTY-FOURTH
ANNUAL REPORT
ON THE
HEALTH OF ASTON MANOR
FOR 1896,
BY
HENRY MAY, L.R.C.P.,
MEDICAL OFFICER OF HEALTH.

PRINTED BY ORDER OF THE DISTRICT COUNCIL.

REPORT

ON THE

HEALTH OF ASTON MANOR

During the Year ending December 31st, 1896,

BY

HENRY MAY, L.R.C.P.,

MEDICAL OFFICER OF HEALTH FOR THE DISTRICT, AND MEDICAL OFFICER TO THE
ASTON MANOR INFECTIOUS HOSPITAL,

Vice-President of the Midland Branch of the Incorporated Society of Medical Officers of Health.

PRINTED BY ORDER OF THE DISTRICT COUNCIL.

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TO THE CHAIRMAN AND MEMBERS OF THE ASTON MANOR URBAN DISTRICT COUNCIL.



GENTLEMEN,

I beg to present you with the following Report for the year ending December 31st, 1896, being my Twenty-fourth Annual Report on the health of Aston Manor.

The chief causes of sickness and mortality in this district have not shown much variation during recent years, and, from a sanitary point of view, this year does not present any very remarkable features. In fact, the social and sanitary conditions of Aston Manor may be considered to have now become fairly settled and established—subject, of course, to extraordinary disturbing causes, such as epidemic influences and climatic extremes, which are almost beyond human control.

Aston Manor is very intimately connected with the City of Birmingham, and to a large extent they are continuous, so that it will always partake with Birmingham, and for better or worse be dependent upon it for its epidemic disease; although I am glad to say that, whilst there is this reciprocity in disease, there is also co-operation in efforts for its prevention.

The climatic characteristics of 1896 have been peculiar, for the average mean temperature of every one of the first seven months of the year was considerably above the average, and in the other five it was below it. The very mild winter and spring was naturally favourable to health and the shortness of the summer helped to reduce the number of deaths from diarrhœa, which is so important a factor in the mortality of this district; but it was very severe until after the high summer temperature abated at the end of July.

The most unsatisfactory matter on which I shall have to report is the greatly increased hold which diphtheria has obtained upon the district, for it has been the cause of more deaths this year than any of the other zymotic diseases except diarrhœa. Influenza has been nearly absent from the death sheet, and scarlet fever, measles, whooping cough, and typhoid fever have not been unusually fatal.

In many respects it has been a fortunate year for Aston Manor. Even more than the two preceding years, it has been one of regular and abundant employment, extending through the many occupations in which the inhabitants of this industrial suburb are engaged. There has, consequently, been unusually little poverty and distress, nor has there been, as there was in the previous year, a long depressing frost to counteract the beneficial effect of prosperity on the general health.

As the natural consequence of these favourable social conditions, the birth-rate has shown during the last few years a tendency to rise above the minimum rate. It is to be expected that one result of a period of continuous regular employment and good wages will be earlier and more frequent marriages, and the returns of the Registrar-General show that the marriage-rate of the country has been higher than for twenty years past. Still the rise in the birth-rate of Aston Manor is a very moderate one, compared with twenty years ago, when it was thirty per cent. higher than now.

Statistics concerning the causes and amount of the mortality of Aston Manor now extend over a quarter of a century, and the tabulated results show an annual average death-rate for the first ten years of 18·4, for the second ten years of 16·1, and for the last five of 15·8 per thousand. This marked diminution in the amount of fatal disease seems to indicate a greatly improved sanitary condition, especially as it is accompanied with a great increase in the density of the population, which has now reached an average of 82 persons per acre. As I have before said, this apparent change for the better is partly the effect of a great alteration which has taken place in the average age of the population of Aston Manor during twenty-five years, viz., a decline in the proportion of those under five, which is the period of life (except age) attended with the greatest mortality; and an increase in the proportion of those between 15 and 30, the period attended with the lowest mortality.

The average result of the various causes of death, as shown in the general death-rate, is better this year than last – in fact, it is the lowest death-rate of the last ten years, excepting 1888 and 1894.

The following table shows the birth and death rates of Aston Manor for the twenty-five years for which you have had returns from the Registrar.

	Birth-rate.	Death-rate.	Infantile Death-rate	Zymotic Death-rate.
Average of decade, 1872-81	42·1	18·4	14·6	4·0
“ “ “ 1882-91	34·1	16·1	14·5	2·7
“ “ five years, 1892-6	32·3	15·8	16·7	3·0
Year 1892	32·5	16·4	15·2	2·6
“ 1893	33·5	16·7	18·7	3·6
“ 1894	31·0	14·0	13·6	2·1
“ 1895	33·1	16·5	19·1	3·1
“ 1896	31·5	15·4	17·2	3·5

Various advantageous circumstances have combined to give Aston Manor its healthy residential character, one of the principal being the abundance of self-contained weekly houses, inhabited by one family, and hence there is very little over-crowding, but there are two aspects in which it appears to me to fall short of the present-day sanitary requirements of a first-class town. One is the number of back-to-back houses, *i.e.*, without a window or door at the back; these were built prior to the date of the adoption of the new building bye-laws in 1882, and the time is not yet ripe to consider their reconstruction. The other is the fouling of the soil and

air caused by the too long tolerated midden system; and although this is slowly but progressively becoming abolished, in the meantime endemic diseases have been introduced which have come to stay.

When writing a Twenty-fourth Annual Report on a place it is difficult to avoid repetition, and I have omitted many details concerning the routine work of the sanitary department in trying to do so. The usual tabulated weekly returns of notified cases have been exchanged between this district, the Local Government Board, and the Warwickshire County Council. Copies of my last Annual Report have been sent to those two bodies, and I have been supplied with a copy of Dr. Bostock Hill's Annual Summary to the County Council of the District Medical Officers' Reports. My son, Francis H. May, D.P.H., has again been appointed by you to act as Deputy Medical Officer, on two occasions when I was absent on account of my health, and his work is included with mine in this report.

Population.—The development and growth of Aston Manor from a country village to one of the most populous urban districts of the country (not yet incorporated) has not been quite so rapid in recent years as it formerly was. This was to be anticipated, as, owing to its limited area, 943 acres, its increase must eventually come to an end, probably with a maximum population of 90,000. During the present very prosperous year it appears to have made more rapid progress. The returns of the enumeration of the Aston School Board just completed, with which I have been supplied by its Clerk, Mr. T. G. Pratt, show that 587 more houses are occupied than at the same time last year, and that the number of unoccupied houses is smaller than on any previous occasion.

The following are the figures of the last five Censuses as applied to Aston Manor:—

Year.	Total Houses.	Houses Void.	Houses Building.	Inhabited Houses.	No. of Persons per inhabited House.	Population.
1851	1,437	105	23	1,309	4.9	6,426
1861	3,562	173	45	3,344	4.9	16,337
1871	7,662	651	83	6,928	4.9	33,948
1881	11,830	1,158	98	10,583	5.1	53,842
1891	14,689	653	147	13,889	4.9	68,639

The following are the figures of the enumerations of the houses by the Aston School Board with which I have been supplied, and the population as calculated from them:—

Year.	Total Houses.	Houses Void.	Houses Building.	Inhabited Houses.	Persons per House.	Estimated Population.
1892	15,353	527	44	14,782	4.9	72,432
1893	15,638	749	12	14,877	„	72,897
1894	15,882	792	37	15,053	„	73,759
1895	16,100	717	23	15,360	„	75,264
1896	16,306	346	13	15,947	„	78,140

The number of persons now entitled to vote in the Parliamentary Borough of Aston Manor is 11,518, as compared with 11,229 last year. There was a re-valuation of the whole district in 1895, and the total rateable value according to the re-assessment of the Poor Rate for 1896-7, was £216,040, and for the District Rate for the same year, £171,047.

This year the Aston School Board has made its triennial educational Census of the children to assist in determining the amount of accommodation required for public elementary school purposes. I have been supplied by Mr. Pratt with the results, and they illustrate and confirm the statement that this district has been changing its character of late years in regard to the average age of the population, and show that, whilst in actual numbers it has increased fifteen thousand, the number of children of school age has only increased about a thousand.

Year of Census.	3 to 5 years.	5 to 7 years.	7 to 10 years.	10 to 13 years.	Total School Age.	Population.
1887	3,322	3,334	4,863	4,247	15,766	62,660
1890	3,368	3,358	4,813	4,408	15,947	68,336
1893	3,354	3,320	4,818	4,611	16,103	72,897
1896	3,592	3,431	4,913	4,846	16,800	78,140

This is evidently an established condition of Aston Manor, and has a close relation to the public health, as it obviates the necessity for providing fresh public elementary school accommodation in accordance with the growth of the population, to prevent over-crowding in the schools.

Another condition, though I hope only a temporary one, has operated in the same direction during the last year or so, namely, the prevalence of measles, scarlet fever, and diphtheria among the children. The Chairman of the Aston School Board, in his last report on the work of that Board, stated that the falling off in the attendance through infectious disease had been considerable, and had for the present rendered any further increase of free school accommodation in Aston Manor unnecessary.

PREVENTION OF DISEASE.

From the accompanying table of notifications of cases of infectious disease, it will be seen that the total number has been greatly in excess of any previous year, and that the increase has been in scarlet fever and diphtheria. The work in this department has increased to a corresponding extent. An additional assistant was appointed at the beginning of the year, who has assisted in furnishing the 917 preliminary reports which have been systematically made to me by the sanitary staff, on the circumstances and surroundings of these cases, and have afforded me the material for further enquiry, for grouping the diseases as to their cause and distribution, and for taking measures to prevent their spread.

The following is a table of the monthly notifications received this year, and the totals of this and the previous two years; it serves to show at a glance the rise and fall of the chief infectious diseases in Aston Manor during 1896.

CASES OF INFECTIOUS DISEASE NOTIFIED TO THE MEDICAL OFFICER DURING EACH MONTH OF 1896,
AND THE TOTALS DURING 1894-5 AND 6.

1896.	Jan.	Feb.	March	April	May	June	July	August	Sept.	Oct.	Nov.	Dec.	Total 1896.	Total 1895.	Total 1894.
Smallpox ...	—	—	—	—	—	—	—	—	—	—	—	—	—	34	202
Cholera ...	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Diphtheria ...	29	24	20	7	15	18	11	18	13	20	16	13	204	109	44
Membranous Croup	—	4	1	—	—	3	1	3	1	3	1	1	18	6	14
Erysipelas ...	10	13	5	7	8	7	2	3	6	4	7	6	78	98	80
Scarlet Fever	42	37	30	26	51	74	44	41	61	71	70	49	596	413	136
Typhus Fever	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Typhoid Fever	4	6	10	4	3	3	8	13	5	10	7	9	82	41	35
Relapsing Fever ...	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Simple Continued Fever ...	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Puerperal Fever ...	—	1	—	—	—	1	1	1	—	1	1	4	10	4	6
TOTAL ...	85	85	66	44	77	106	67	79	86	109	102	82	988	705	516

The responsible duty of notifying these cases has been faithfully performed by the medical men practising in the district, and I have seen a number of them for various reasons, in concert with the medical attendants. I am pleased to acknowledge the help they have given me in securing appropriate disinfection.

The following is a summary of this work, both for this and last year; further details will be given when I report separately on the diseases which have had attention.

Year.	Notices sent to Head Teachers of Infectious Diseases among School Children.	Houses fumigated with sulphur after Infectious Disease.	Lots of Bedding and Clothing disinfected at the apparatus.	Premises stripped and cleansed after infection on Medical Certificate.	Cases sent to Isolation Hospital.
1895	602	388	352	297	227
1896	937	737	726	674	257

I regret that no action has yet been taken to improve the obsolete system of disinfection now in use, to which I have referred in previous reports. The following is a statement as to the total number of lots and articles fetched away and returned home disinfected at the apparatus during the year free of charge, under the superintendence of Mr. Treadaway, including those from other districts for which it is undertaken:—

Districts.	1895.		1896.	
	Lots.	Articles.	Lots.	Articles.
Handsworth	134	2,156	255	2,973
Erdington and Castle Bromwich	33	898	33	624
Sutton Coldfield	9	329	23	285
Aston Manor	352	4,887	718	8,785
Private	4	53	2	10
Total	532	8,323	1,031	12,677

In consequence of a communication from the Free Library Committee at the beginning of the year, I reported to the Health Committee that, in consideration of the possibility of infectious disease being conveyed by means of books circulating from the lending department, through being used by an infected person or in an infected house, it was advisable that, in addition to the enquiries at present made in cases of diphtheria and scarlet fever, enquiry should be made as to whether any library book was in use; and, if so, that it be not returned to the library until it is disinfected, along with the bedding and clothing, or separately - a list of such cases to be supplied to the Librarian. I also recommended that soiled and dirty books should be withdrawn from circulation at an earlier average stage than at present. These recommendations have since been adopted and carried out.

The isolation arrangements will be referred to more properly under the heads of scarlet fever, and infectious hospital. Supervision has been given to cases treated at home. Notices have been immediately sent to the head teachers of schools where any children have been attending suffering from scarlet fever or diphtheria. The relation between these cases and the different schools has been carefully watched, and timely warning sent to the managers of any unusual prevalence, but no action has appeared advisable in connection with school closure.

Small-pox.—Why some diseases show a large amount of periodicity in their prevalence, with intervals of quiescence, is beyond our knowledge, but this is well recognised as a characteristic of small-pox. Except the virulent outbreak at Gloucester, and its extension into neighbouring places, this country has been nearly free from it this year. No case whatever has occurred in Aston Manor, and, judging from the past, I do not anticipate any epidemic outbreak again for some years. There were several cases reported in Birmingham during the Gloucester outbreak, one or two very close to the boundary of Aston Manor.

I said in my last report that efficient infantile vaccination in Aston Manor was becoming unpopular and neglected. I have frequently had occasion this year to inspect young children belonging to it, and have found that the majority are not now sufficiently vaccinated, that many have only one very small scar, and that an increasing number are unvaccinated. With your authority I have furnished lists of the latter to the Aston Board of Guardians.

The immunity against small-pox which efficient vaccination affords will not, therefore, be possessed in any future epidemic to the same degree as in the past, and though the responsibility for this does not lie on the Aston Manor District Council, it makes your duty in providing sufficient accommodation for the isolation of cases a more onerous one. An isolation hospital for small-pox ready provided will serve to postpone an epidemic until such time as the neglected vaccination is adopted under the influence of panic, but vaccination is the only real safeguard.

Scarlet Fever.—This disease was present to a moderate extent throughout 1894 and the first half of 1895. It prevailed extensively during the second half of 1895, when it abated considerably; but it has been very prevalent during the second half of 1896. The same increase appears also to have taken place pretty generally throughout the country. It has also assumed a more severe type locally; there have been a considerable number of dangerous cases, but on the other hand it has frequently happened that the nature of the disease has not been recognised until the characteristic peeling has been seen later on. The mortality among the notified cases in Aston Manor has been 3·7 per cent. this year, as compared with 2·6 per cent. last year, and an average of 4·2 per cent. for the chief towns of the country.

The following table shows the number of cases of scarlet fever during the six complete years in which notification has been in force; also the action taken in regard to them:—

Year.	Cases of Scarlet Fever reported.	Infected houses.	Deaths registered including those in Hospital	Houses stripped and disinfected on Medical Certificate.	Lots of clothing and bedding disinfected at apparatus.	Cases isolated in Hospital.	Percentage of cases isolated.
1891	337	218	23	236	242	124	37
1892	406	293	13	288	295	92	22
1893	214	176	6	183	177	82	36
1894	136	93	5	81	93	38	28
1895	413	286	11	241	255	198	48
1896	596	446	22	460	486	257	43

The following is a table of the ages at which the cases and the deaths took place :—

Ages.	Cases.			Deaths.		
	1894	1895	1896	1894	1895	1896
Under 5 years	32	123	179	3	7	12
From 5 to 10 years ...	57	172	249	2	4	7
From 10 to 15 years ...	29	84	106	—	—	1
From 15 to 20 years ...	8	21	28	—	—	1
At 20 and upwards ..	10	13	34	—	—	1
	136	413	596	5	11	22

Although the proportion amongst adults is rather larger than usual this year, the above table gives additional confirmation to the statement that this is not a disease of adult life, and this not because it has been had in childhood, as the majority of children escape it. In this fact lies the strongest inducement for you to persevere in the apparently disappointing efforts which have been so industriously made by isolation and otherwise to diminish the spread of scarlet fever; for it is not necessary to have it in childhood, and, childhood escaped, the risk of having it at all is greatly diminished, every year of life giving increased immunity.

The number of cases isolated in the infectious hospital has been larger this year than in any previous one, and during one part of the year the resources of the hospital were fully taxed to provide for them, although no case was refused admission. If the proportion of cases isolated had increased during the epidemic period, additional accommodation would have been called for.

The proportion of cases isolated of those notified has been 43 per cent, as compared with 48 per cent. in 1895. Enquiry was always made as to whether persons were willing to go, or to send their children to the hospital, and I have had frequent communications with the medical attendants on the subject. As usual, a small weekly contribution has been required towards the cost of maintenance, except where it would be a hardship, and with only one exception these arrangements have worked without any friction. I need not dwell upon the advantages hospital isolation affords to those suffering from scarlet fever as well as to the public.

Measles.—Although there is not any notification in force for this disease, weekly returns have been supplied me by the Aston School Board of cases among children attending school; and the total number of cases supplied this year is 500. It was very prevalent in the last three months of 1895, and five infant departments were closed by the School Board on my recommendation for limited periods, succeeded by the Christmas holiday. On the resumption of school attendance in January this year, it was evident that the disease was not nearly so prevalent, although ten deaths from it were recorded in the first three months of the year. Since then it has only been present in the district in a mild form. The total deaths this year were 20, as compared with 18 in 1895 and 53 in 1894.

From a theoretical point of view, the same good reasons apply to bringing all our resources to bear to prevent the spread of measles as of scarlet fever and diphtheria, especially as, like these diseases, every year of age after infancy confers additional protection, but it is desirable that some place more favourably circumstanced than this should first show a successful object lesson. From a practical point of view I could not advise your entering at present into this fresh field of work, with all it would imply of special hospital provision, notification, additional staff, &c.

Diphtheria.—The following table shows the number of cases of diphtheria and membranous croup which have occurred in Aston Manor during the last three years, and the action taken in consequence.

Year.	No. of cases of Diphtheria reported.	No. of infected houses.	No. of Deaths registered.	No. of Houses stripped and disinfected on Medical Certificate.	No. of lots of clothing and bedding disinfected at apparatus.	Percentage of deaths to cases
1894	58	47	10	4	12	17·2
1895	115	85	35	37	46	30·4
1896	222	178	51	145	186	23·0

This great increase in its prevalence and fatality is a matter of serious importance, and there will scarcely be any satisfaction felt in the fact that this increase is not confined to Aston Manor, but is also the case in Birmingham, London, &c. The extraordinary increase began here in the second week of December last year, and has continued irregularly through this year.

It is a very difficult problem to solve. "How best to combat the increasing spread of this dangerous infectious disease." There is a growing recognition of the fact that a large number of unrecognised cases occur, of a mild character, without characteristic signs (unless bacteriological), and yet that these can carry the infection. Thus many outbreaks occur for which there is no cause discovered, and sewer-gas, bad drains, tips, and unsuitable sites and soils are blamed, whereas they were only predisposing influences.

I have carefully watched the relations between outbreaks of diphtheria and school attendance in Aston Manor, and although it does not appear that the general mode of its diffusion has been by schools, in special circumstances its spread among the children of a school may become rapid and general. There have been some instances this year in which there was occasion to suspect a public school was a medium of transmitting it, and the circumstances were immediately reported to the school authorities. I should be sorry, however, to fail to recognise the vigilance shown in this matter by school teachers, which has not been expended in vain.

I described last year a special outbreak of diphtheria in connection with one of the Board Schools of unprecedented severity, which accounted for 40 out of the 53 cases notified in December, 1895, and for 14 of the 35 deaths of that year. The school was re-opened after a closure of six weeks, including the Christmas holidays, on January 20th, 1896, and no case could be traced showing any connection with the school after the middle of February. The total results of that outbreak in Aston Manor were 56 notified cases and 16 deaths.

The ages of the 275 cases notified, and of the 69 deaths registered during the last thirteen months, show that diphtheria has especially attacked children under ten years of age, and has been most fatal in children under five, also that attacks in adults have rarely been fatal.

Age.			Cases.	Deaths	
Under 1 year	...	...	5	...	2
From 1 to 5 years	...	...	62	...	33
„ 5 to 10	„	...	105	...	29
„ 10 to 15	„	...	38	..	4
„ 15 and upwards	...	...	65	...	1

I have adopted the course of regarding the term “membranous croup” as synonymous with diphtheria. In the recent nomenclature of diseases of the Royal College of Physicians of London, “membranous croup” is regarded as a synonym for laryngeal diphtheria, and “croup” is no longer used as the name of a disease. It is also the practice of the office of the Registrar-General to class under the head of diphtheria, all deaths which are referred to membranous croup. In this district this year a case was notified as diphtheria, and the death certified as membranous croup. There have been altogether 18 cases notified as membranous croup, of which 14 were fatal, occurring in 11 houses. Their infectious nature is proved, because four of the houses had more than one case, and in one the whole family of three children died in a few days, and in three of these houses other cases of diphtheria were notified also.

A few cases notified as diphtheria were intimately associated with scarlet fever. There have also been 4 deaths during the year registered as “croup,” I communicated with the medical men, and was informed they were not regarded as infectious, and they are not included in these diphtheria statistics.

Typhoid Fever.—This district has not been visited by typhoid fever to any serious extent since 1893. There have been more cases during this year than the two which preceded it, but there has rarely been a second case in a house or neighbourhood. There was as usual an increase in the number of cases after the diarrhoea outbreak, but I have not been able to discover any general cause which would account for this year’s considerable increase. The number notified, 75, and the deaths, 15, compare with 41 cases and 6 deaths in 1895.

Diarrhoea.—As usual the fatality of this disease was almost confined to a few months of the year, and to infants. The following is a statement of the number and ages of deaths for the last three years.

1894.	1895.	1896.	
29	113	104	Infants under one year.
2	16	10	Between one and five years.
—	4	2	Between five and sixty-five years.
1	4	4	Above sixty-five.
—	—	—	
32	137	120	
—	—	—	

This does not give the whole extent of the mortality from diarrhoeal diseases; it includes those from gastro-enteric catarrh and intestinal catarrh, but not those from enteritis and gastro-enteritis.

In 1895 the period of greatest summer heat was in September, that month having a mean temperature of $5\cdot2^{\circ}$ above the average, and the great diarrhœa mortality was in October. In 1896 the greatest summer heat was in June, the mean temperature being $3\cdot2^{\circ}$ above the average, and the highest diarrhœal mortality was in July; the months of August and September were comparatively cold, and but few deaths from diarrhœa occurred after August.

INFECTIOUS HOSPITAL.

There has been no year since this hospital was opened, eleven and a half years ago, during which so many cases have been isolated there, not only from Aston Manor but from the four other districts from which you admit cases under agreement.

The following is a table of the cases admitted to the hospital since it was opened :—

Year.	Aston Manor.	Erdington.	Castle Bromwich.	Sutton.	Saltley.	Birmingham.	Work-house.	Other.	Total.
1885	9	1	—	—	—	—	—	—	10
1886	14	1	—	—	—	—	—	—	15
1887	22	—	—	6	—	—	—	—	28
1888	17	7	—	23	—	—	17	2	66
1889	76	7	—	8	16	23	20	2	152
1890	160	44	—	8	9	20	24	1	266
1891	124	13	—	65	17	—	3	2	224
1892	92	8	—	7	—	—	11	2	120
1893	194	20	—	3	—	—	1	2	220
1894	208	31	—	7	—	—	4	3	253
1895	227	52	11	25	—	—	10	2	327
1896	257	75	5	55	3	15	2	—	412

The whole of the 412 cases admitted this year (except the 18 from Birmingham and Saltley) were scarlet-fever cases.

The accommodation appropriated to scarlet fever at present consists of—

Three pavilions, of two wards, for six adults each	...	36 persons.
One pavilion, of two wards, for ten adults each	...	20 „
One pavilion, of four small wards, for quarantine ..	...	10 „
		—
		66
		—

This accommodation affords 2,000 cubic feet for each patient; but, as I have previously stated, the majority of scarlet-fever inmates are convalescent children; it has, therefore, been possible to accommodate nearly a hundred patients at a time without dangerous over-crowding.

The Medical Officer has attended the monthly meetings of the Hospital Management Subcommittee. The services of Mr. Black, the resident Superintendent at the hospital, have been recognised by your Council, in

awarding him unanimously an increase in his salary, and the Medical Officer of Health desires to acknowledge his continued attention to the satisfactory working of the hospital and interest in the welfare of the patients; Dr. F. H. May, the Deputy Medical Officer, has also rendered valuable assistance in their care and treatment.

Scarlet Fever.—The following is a statement of the number of cases of scarlet fever which have been admitted, discharged, or died during the last two years.

			1895.	1896.
Remaining from previous year	...	...	8	84
Admitted during the year	...	...	294	394
			—302	—478
Discharged during the year	...	...	213	414
Died during the year	...	...	5	14
Remaining at the end of the year	...	...	84	50
			—302	—478
			—	—

The total mortality of the year was 3·5 per cent. upon the admissions, as compared with 1·7 per cent. in 1895. The deaths among the Aston Manor cases numbered nine, among the Sutton cases four, among the Erdington cases one. The deaths among the Aston Manor and Sutton cases were all but one registered in the Handsworth Registration Sub-district in which the hospital is situated, and the Erdington and one Aston Manor death in the Erdington Sub-district, as they were nursed in the adjacent building, which is situated in that district. The chief cause of dangerous illness and death has been the kidney complication of the disease. One death from Aston Manor was caused by typhoid fever, evidently acquired previous to admission with scarlet fever. The Erdington death was caused by diphtheria supervening upon scarlet fever.

Among the many difficulties met with in the management of a hospital for scarlet fever, the one which has required the most attention is the re-appearance of the disease in the household shortly after a case has been returned home from the hospital. This matter has taken a front place through the publicity given to a Birmingham case last year, when a parent obtained a sum of money in the County Court as damages through the re-appearance of the disease in the family after the discharge of a case from the City Hospital. At the beginning of this year a claim was made against your Council for damages through the disease re-appearing in a house in Erdington after the discharge of a child from the hospital. The Health Committee reported that “after a careful enquiry they had come to the conclusion that there was no liability upon the part of the Council, and recommended that the Clerk, as Solicitor to the Council, be authorised to defend any proceedings which might be instituted.” This report was adopted, and nothing more has been heard of this claim.

It is not for me to say anything concerning the legal aspect of such claims, but, after having had the responsibility for the discharge of nearly two thousand cases, I know of no positive indication when infection no longer exists in a scarlet-fever patient. I have tested the plan of detention in hospital for some weeks after every indication of the disease has disappeared, and there have been recurrences of the disease, just before, shortly after,

and several weeks after discharge. There will always be an irreducible minimum of such cases, and prolonged detention to prevent them is striving after an unattainable ideal. Hospital isolation is the best means you possess for preventing the spread of the disease; at the same time it has its unavoidable drawbacks and deficiencies, which must be frankly accepted in arriving at a fair estimate of its value.

The following is an illustration of the perplexing incidents attending hospital isolation. During the year a child was admitted with scarlet fever, the first case in a large family, who unfortunately died there. About the tenth week after its admission, the time when in ordinary circumstances its discharge would have taken place, six other children of the family were attacked with scarlet fever. The apparent explanation was that the parent had after the interval brought back into use a sponge used to the first child.

Small-pox.—I have already stated that some cases of small-pox had been isolated at the hospital during the year, although no cases had occurred in Aston Manor. The Urban Sanitary Authority of Saltley made an agreement years ago with you for the isolation of cases of small-pox and scarlet-fever, and, though Saltley has since been annexed to Birmingham, the agreement remains in force. An understanding was, however, come to last year that as far as possible Saltley scarlet-fever cases should be sent to Birmingham, and that small pox cases in the city, as well as Saltley, should be sent here. Several outbreaks of small-pox have since occurred, both in Saltley and Birmingham, and the resulting cases, three from Saltley and fifteen from Birmingham, have been isolated satisfactorily during the year in the detached cottages at this hospital. These buildings are situated in the Erdington Registration Sub-district, and the five deaths which occurred among them were registered there. The Birmingham City Council has cordially recognised the assistance this arrangement has given, and the medical officers to the hospital who attended the cases and assisted in the preliminary diagnosis, have had their services recognised by the Birmingham Health Committee in a gratifying manner.

I reported last year that you had affirmed the desirability of a new small-pox hospital on a fresh site, at such a distance from the present hospital as would comply with the requirements of the Local Government Board, as expressed in the Memorandum of its Medical Officer of January, 1895, and that the Clerk, Mr. Ansell, was authorised to enter into negotiations for a suitable site and provisional contract for its purchase. At the August meeting of the Council this year the Health Committee reported that they, after endless trouble in seeking a suitable site, had on offer a piece of land on the road leading past the present hospital, a quarter of a mile distant from it, and that the price asked was £1,000 for 3 acres, and £1,500 for 5 acres; that, in the Committee's opinion, three acres were sufficient for all practical purposes, and that £250 would be required for drainage. The Council approved the purchase, and empowered the Committee to make the necessary contract, and resolved that application be made to the Local Government Board for sanction for a loan for this sum and costs. An enquiry was held into the subject-matter of this application by Geo. Seaton Buchanan, Esq., M.D., the Inspector appointed by the Local Government Board, upon December 11th, 1896, at which I gave evidence.

SANITARY WORK.

The work of dealing with the nuisances of the district increases yearly. It is carried out, under the authority of the Health Committee (to whom the sanitary work of the district has been delegated), by Mr. Benj. Bolt, Inspector of Nuisances, with two assistants. The Inspector has submitted a report of the work done in his department during the year, and a summary of it is printed at the end of this report. The Medical Officer is glad of the opportunity of again acknowledging his valuable co-operation and great devotion to the work of his office.

The Inspector reports 2,205 nuisances abated in connection with 8,155 houses, as compared with 2,188 notices in connection with 5,398 houses in 1895, and, as usual, the number remaining unabated at the end of the year is very small. A considerable number of them were discovered in the course of the visits made to the 801 houses in which there was infectious disease reported. The following nuisances were discovered in the course of the usual house-to-house visitation made each year of a part of the district.

No. of Houses Visited.*	Class of Houses.		No. of Houses supplied with Water from		No of Ashpits.	No. of Privies.	No. of Middens.	No. of Water Closets	Nuisances Discovered and Abated.								
	Through.	Back-to-Back.							Drains requiring Disconnection.	Middens requiring Reconstruction.	Defective Drains.	Filthy Premises.	Filthy Privies.	Dilapidated and Defective Buildings.	Animals kept as a Nuisance.	Others.	Total.
			Tap.	Pump.													
482	232	250	477	5	58	229	158	77	5	16	84	66	31	59	11	11	283

* Also 16 Factories and Workshops.

The Medical Officer has visited and reported on, or been prepared to advise concerning a number of nuisances, in regard to which legal proceedings were contemplated, and especially on several terraces and blocks of houses in which the privy arrangements were insanitary. The Inspector also reports 647 visits to the 34 private slaughter-houses on the register, and that at least two visits were made to each milkshop and cowshed. There are now 400 milk purveyors and 8 cowkeepers on the register. The Health Committee referred an application to enter the name of a fresh occupier of a slaughter-house upon the register to the Medical Officer, who reported that the premises were unsuitable, and had been out of use for a long period; also that the notice board, required by Sec. 170 of the Public Health Act, 1875, under penalty, was no longer affixed. He recommended that this, and three other slaughter-houses similarly circumstanced, should no longer be retained on the register, and on the recommendation of the Health Committee the Clerk was authorised to remove them.

Offensive Trades.—No action has been required in connection with the very few establishments here where an offensive trade is carried on. An application has been made under Sec. 110 of the Public Health Act for the sanction of the Council to the establishment of a soft soap manufactory on some disused premises. The Medical Officer visited the premises and reported; and sanction was granted for a limited period, for making soft soap only, upon necessary and proper terms and conditions set forth in an agreement.

Smoke.—Monthly reports of the results of the Inspector's 242 observations on the factory chimneys have been made by him to the Health Committee, showing that black smoke was found issuing in 32 instances for over twelve minutes in the hour; 24 notices have been served for their abatement, and these reports have been carefully considered with a view to further proceedings being taken.

Workshops and Bakehouses—These have been regularly visited by Mr. Bolt since he was appointed by you to inspect them in 1892, when the sanitary regulation of workshops was transferred to sanitary authorities, and the register then instituted has been maintained. There are now 350 workshops on the register and 97 retail bakehouses.

SANITARY STATE OF THE DISTRICT.

The duty of giving an account in his annual report of the sanitary state of the district generally at the end of the year, affords an occasion for the Medical Officer to refer to several matters relating to the health of the district in which he has assisted by conference and advice; also to others in which he has not taken any direct part.

New Houses.—The supervision of new houses and buildings is a matter of much importance in a progressing district like Aston Manor, and the Surveyor, Mr. H. Richardson, A.M.I.C.E., has afforded the Medical Officer opportunities of seeing the plans submitted and of making suggestions upon them. The Surveyor reports the following as the number of houses and other buildings for which plans have been submitted during the year, and which have been completed and inspected by him.

Year.	New Houses for which plans have been approved.	Other Buildings.	New Houses completed and inspected.	Other Buildings.
1890	527	101	472	110
1891	469	63	370	64
1892	344	87	452	75
1893	396	45	322	45
1894	169	97	176	62
1895	357	92	213	61
1896	130	50	260	31

Among the plans submitted for building was one for twelve new houses proposed to be built upon a site which had been raised 8 feet or so above the ground by tipping rubbish in the past; at the request of the

Surveyor, the Medical Officer visited the site and examined portions of the soil, and reported to the Health Committee that they were impregnated with animal and vegetable matter, and that the site was unfit for building in consequence. The plans were subsequently disapproved by the Council under the building bye-laws and Sec. 25 of the Public Health Acts Amendment Act, and the erection of the houses has been postponed. In other six houses erected on an adjacent site, subject to covering the site with concrete, the Surveyor having reported that the concrete was unsatisfactory, he was authorised to issue a summons to amend it, but the work was done to his satisfaction. The Medical Officer has also inspected and reported on the condition of a tip used by you for the deposit of street mud.

The new houses which have been built have been supplied with closets with pans and cisterns, and dry ashpits attached, and the Surveyor reports that 315 new W.C.'s have been built during the year. Besides these, the Inspector reports that 265 fresh W.C.'s, with dry ashpits, have been erected under his supervision, for the abatement of nuisances and insanitary conditions through deep, wet, or offensive middens and privies. This is a large number abolished in one year, and, being done without a prosecution, shows that public opinion among property owners is helping on the abolition of the midden system.

House Refuse Disposal.—The report of Mr. Treadaway, Superintendent of the Night-soil Department, printed at the end of this report, shows that 13,696 loads of house refuse were removed by night and 5,708 loads by day, a total of 19,404 loads. There is a continual yearly decrease in the quantity of night-soil removed, and a corresponding increase in the stuff removed by day. The estimated net cost of removing and dealing with this refuse, including the cost of maintaining and working the eight-celled destructor, is £4,105, to which is to be added £3,920 the amount of the precept for treating the sewage at the outlet works.

At the instance of the Night-soil Sub-committee I prepared a handbill, which has been issued to draw the attention of householders to the disadvantage and danger arising from throwing slops into these fixed receptacles for filth, and the efficiency of the arrangements for removing night-soil serves to diminish the objections to the system. After enquiry by a Local Government Board Inspector, loans have been sanctioned and works are proceeding for improving the depôt. The destructor has consumed 14,763 tons of refuse during the year, an increase of 2,003 tons upon the amount consumed in 1895.

Food.—No seizure has been made of unwholesome food, but the 871 visits of the Inspector to butchers' and provision shops show that there has been no want of vigilance, and I can bear witness to the average high character of the food supply of the district. The action of your Inspector (Mr. Bolt) under the Food and Drugs Act has also helped to maintain the high character of the food supply.

The question as to whether the Warwickshire County Council, or, as heretofore, the District Council, shall be responsible for the appointment of the Inspector for this district, and the carrying out of the Food and Drugs Acts in it, has been the subject of your attention, and Mr. Bolt prepared the following table for the Health Committee, showing the amount of work done in this respect during the last 16 years.

FOOD & DRUGS ACTS & MARGARINE ACT, 1881 TO 1896 INCLUSIVE.

Nature of Articles.	No. of Samples taken.	Genuine.	Adulterated.	Poor in Quality.	Cautioned by Committee.	Prosecutions.		Fines.			Costs.		
						Refusing to supply.	Adulteration.						
								£	s.	d.	£	s.	d.
Milk ..	2389	1908	424	57	193	8	213	341	8	6	119	2	0
Butter ..	407	336	71	—	10	—	61	87	4	6	41	6	0
Lard ..	49	47	2	—	1	—	1	0	5	0	0	8	6
Coffee ..	167	161	6	—	6	—	—	—	—	—	—	—	—
Pepper ..	81	74	10	—	10	—	—	—	—	—	—	—	—
Mustard ..	54	49	5	—	5	—	—	—	—	—	—	—	—
Vinegar ..	7	3	4	—	—	—	—	—	—	—	—	—	—
Spirits of Nitre	4	2	2	—	2	—	—	—	—	—	—	—	—
Spirits ..	137	129	8	—	8	—	—	—	—	—	—	—	—
Bread ..	8	8	—	—	—	—	—	—	—	—	—	—	—
Flour ..	6	6	—	—	—	—	—	—	—	—	—	—	—
Cheese ..	6	6	—	—	—	—	—	—	—	—	—	—	—
Oatmeal ..	32	32	—	—	—	—	—	—	—	—	—	—	—
Tea ...	2	2	—	—	—	—	—	—	—	—	—	—	—
Ginger ..	4	4	—	—	—	—	—	—	—	—	—	—	—
Arrowroot ..	2	2	—	—	—	—	—	—	—	—	—	—	—
Jam ...	1	1	—	—	—	—	—	—	—	—	—	—	—
Beer ...	3	3	—	—	—	—	—	—	—	—	—	—	—
Sweets ..	5	4	1	—	—	—	1	—	—	—	0	6	6
Cream of Tartar	6	6	—	—	—	—	—	—	—	—	—	—	—
Bicarbonate of Potash	1	1	—	—	—	—	—	—	—	—	—	—	—
Milk of Sulphur	4	4	—	—	—	—	—	—	—	—	—	—	—
Paregoric ..	3	3	—	—	—	—	—	—	—	—	—	—	—
Cod Liver Oil	1	1	—	—	—	—	—	—	—	—	—	—	—
Olive Oil .	1	1	—	—	—	—	—	—	—	—	—	—	—
Total ...	3383	2793	533	57	235	8	276	£428	18	0	£161	3	0

Your Inspector has reported monthly to the Health Committee as to the samples taken during this year, and the results and particulars are given on page 29 of this report.

Water Supply.—Aston Manor derives its water supply from the same sources as Birmingham, and the supply has been constant and sufficient. In these respects the district is fortunate; neither has the Medical Officer had reason to doubt that everything possible has been done by the Birmingham Water Department to maintain the purity of the water by filtration and otherwise. At the same time the quality of the water leaves much to be desired, and when the arrangements are completed, which are now in progress, to bring hither the pure soft water of the Welsh hills, all reasonable grounds of suspicion will be removed, and Aston Manor will have cause for congratulation.

There are still a few private wells, and I have examined 4 samples taken from them. In two instances I found the water evidently contaminated with sewage, and injurious to health. The usual preliminary notices were served to close the wells, and the owners have substituted the tap water.

Public Mortuary.—This was erected last year by the Warwickshire County Council by the side of the Aston Police Courts at your cost, and has fulfilled its purpose very well. Mr. Walker, the Superintendent of Police, informs me that 14 bodies have been deposited there in 1896.

VITAL STATISTICS.

It is important to have a reliable basis for the estimated population on which the birth and death rates are reckoned, and between the censuses, the annual enumeration by the Aston School Board of the occupied houses of the district affords the necessary material. The number of inhabited houses at the close of the present year is 15,947, which, multiplied by the average number to each occupied house at the census 4.9, gives 78,140, as the present population. The mean between this and 75,264, the estimated population at the close of last year, gives 76,702, the estimated population for the middle of the present year.

Births.—The number of Births registered this year is 2,417, which is 48 less than last year, and the birth-rate for the year is 31.5 per thousand, which is 1.6 lower than last year; the lowest point yet reached was 31.0 in 1894. The births of males were 1,154, of females 1,263.

Deaths.—I have classified the deaths as to their causes and ages at which they took place in the tables on pages 26 and 27, dividing life into seven different periods. From the first column in these will be seen the chief causes of mortality among the 416 infants who died during the year. It will also be seen that the deaths from phthisis were less than last year, and it is satisfactory to note that the deaths from tubercular disease are decreasing of late years. Respiratory diseases have not been so fatal as in the influenza epidemic years 1889-93.

The following table gives the number of deaths at different periods of life during the last two years :—

	Males.		Females.		Totals.	
	1895.	1896.	1895.	1896.	1895.	1896.
Under 1 year	244	216	228	200	472	416
From 1 to 5 years	75	77	93	99	168	176
„ 5 to 15 „	23	25	39	35	62	60
„ 15 to 25 „	16	15	12	29	28	44
„ 25 to 65 „	159	151	179	144	338	295
At 65 and upwards	72	81	98	108	170	189
	589	565	649	615	1,238	1,180

The total number of deaths registered is 1,180, which is 58 less than last year, when it was 1,238. In these numbers are included those deaths which occurred in the infectious hospital amongst the cases removed from Aston Manor and registered in other districts.

The general death-rate for this year is 15·4, which is 1·1 lower than last year. However useful this rate may be as a means of comparing the mortality of Aston Manor in different years, it is not a satisfactory basis for comparing it with other places with different age and sex constitution. I have calculated the general death-rate for England and Wales as if its population had been subject to the same mortality as regards age and sex as Aston Manor. This gives a "corrected" death-rate of 16·8, and the factor is 1·092. The chief difference between the two rates is caused by the small proportion, 2·8 per cent., of persons at and above 65 years in Aston Manor, as compared with 4·7 per cent. in England and Wales. It would not be fair to compare even a corrected death-rate, *i.e.*—with allowances for local peculiarities as to age and sex—with that of other places, because many deaths belonging to Aston Manor occur in institutions outside, and there are no outside deaths to equalise this.

The infantile death-rate, or percentage of deaths under a year to the infants born in the year is 17·2, as compared with 19·1 in 1895. This rate varies very much with the diarrhoeal mortality, though the increasing number of premature births is also a factor. Notwithstanding the improved general death-rate and the lowered birth-rate in the quarter of a century, there has been no improvement in the infantile death-rate but the reverse in Aston Manor, showing that there has been no advantage to infant life derived from a lower birth-rate.

The number of deaths from the seven principal Zymotic diseases was 272, as compared with 234 last year, and the Zymotic death-rate was 3·5, as compared with 3·1 last year.

Uncertified Deaths.—There were 45 deaths registered this year which were not certified as to the cause of death by any medical man, as compared with 54 last year. These included 3 deaths of infants stated to have been accidentally suffocated in bed, 20 stated to have died in convulsion fits or convulsions. In these cases the cause of death was entered by the Registrar according to the best information he could obtain.

There were also 16 cases on which inquests were held, as compared with 12 in the previous year.

I remain, Gentlemen,

Your obedient Servant,

HENRY MAY.

December 31st, 1896.

DEATHS REGISTERED IN ASTON MANOR. CLASSIFIED ACCORDING TO
DISEASES AND AGES.

1896.	0-1 Year.	1-5	5-15	15-25	25-45	45-65	65 and Upw'ds.	Total 1896	Total 1895
I.—Specific Febrile, or Zymotic Diseases.									
Miasmatic Diseases.									
Smallpox .. .. .	..	..	..	..	..	..	..	..	4
Measles	1	18	1	..	..	..	..	20	18
Scarlet Fever .. .. .	..	12	8	2	..	..	..	22	11
Typhus Fever .. .. .	..	..	..	..	..	..	..	..	..
Whooping Cough	17	23	2	..	..	..	..	42	35
Diphtheria, Membranous Croup	2	27	31	1	..	..	..	51	32
Simple, Continued, or Ill-defined Fever	..	..	..	..	..	..	..	..	..
Enteric or Typhoid Fever .. .. .	..	..	1	3	10	1	..	15	6
Influenza .. .. .	..	..	1	..	2	..	..	3	16
Other Miasmatic Diseases .. .. .	..	1	..	..	..	..	..	1	..
Diarrheal Diseases.									
Simple Cholera .. .. .	..	..	..	..	..	..	..	..	..
Diarrhea, Dysentery	104	10	2	1	..	1	4	122	137
Venereal Diseases.									
Syphilis	4	..	..	..	2	1	..	7	5
Gonorrhoea, Stricture of Urethra	..	..	..	..	..	..	..	..	..
Septic Diseases.									
Frysipelas	2	..	..	1	..	..	..	3	2
Pyæmia, Septicæmia .. .. .	..	..	1	1	..	..	..	2	3
Puerperal Fever, Puerperal Septicæmia	..	..	..	1	3	..	..	4	..
II.—Parasitic Diseases.									
Thrush and Vegetable Parasitic Diseases	1	..	..	..	..	..	..	1	3
Worms, Hydatids .. .. .	..	..	..	..	..	..	..	..	..
III.—Dietetic Diseases.									
Want of Breast Milk, Starvation	1	..	..	..	..	..	..	1	..
Scurvy .. .. .	..	..	..	..	..	..	..	..	..
Chronic Alcoholism, Delirium Tremens	..	..	..	..	2	..	..	2	2
IV.—Constitutional Diseases.									
Rheumatic Fever, Rheumatism of the Heart	..	..	3	..	2	1	1	7	4
Gout .. .. .	..	..	..	..	..	..	..	..	1
Rickets .. .. .	..	2	..	..	..	..	..	2	4
Cancer, Malignant Disease .. .. .	..	1	..	..	2	20	18	41	34
Tabes Mesenterica	7	5	..	..	..	..	..	12	11
Tubercular Meningitis, Hydrocephalus	6	5	1	..	..	..	..	12	7
Phthisis .. .. .	..	..	..	13	28	18	..	59	87
Other forms of Tuberculosis, Scrofula	1	2	3	..	2	..	..	8	12
Anæmia, Chlorosis, &c. .. .. .	..	..	..	1	1	..	..	2	..
Diabetes Mellitus	1	..	..	1	1	..	1	4	3
Other Constitutional Diseases .. .. .	..	..	..	..	..	..	..	..	1
V.—Developmental Diseases.									
Premature Birth	34	..	..	..	..	..	..	34	62
Atelectasis	4	..	..	..	..	..	..	4	6
Congenital Malformations	1	1	..	..	..	..	..	2	5
Old Age .. .. .	..	..	..	..	..	1	43	44	47
VI.—Local Diseases.									
DISEASES OF NERVOUS SYSTEM.									
Inflammation of Brain or Membranes	5	4	1	..	3	..	..	13	28
Apoplexy, Softening of Brain, Paralysis	..	..	..	3	8	18	31	60	51
Insanity, Paralysis of the Insane	..	..	..	..	..	1	..	1	1
Epilepsy .. .. .	..	..	1	..	..	2	1	4	5
Convulsions, Eclampsia	32	12	..	..	..	..	..	44	65
Laryngismus Stridulus (Spasm of Glottis)	3	..	1	..	..	..	..	4	3
Disease of Spinal Cord, Paraplegia	..	..	..	..	..	2	..	2	3
Other Diseases of Nervous System	1	..	..	1	1	2	1	6	3
DISEASES OF CIRCULATORY SYSTEM.									
Pericarditis .. .. .	..	..	..	..	1	..	..	1	..
Valvular Diseases of Heart .. .. .	..	..	..	1	3	7	5	16	20
Syncope	2	..	..	..	..	1	3	6	3
Other Diseases of Heart	1	1	..	3	8	18	14	45	48
Aneurism .. .. .	..	..	..	..	..	1	..	1	3
Embolism, Thrombosis .. .. .	..	..	..	..	1	1	..	2	..
Other Diseases of Blood Vessels .. .. .	..	..	..	2	..	1	1	4	..
Carried over.. .. .	230	124	47	35	80	97	123	736	791

DEATHS REGISTERED IN ASTON MANOR. CLASSIFIED ACCORDING TO
DISEASES AND AGES.—*Continued.*

1896.	0-1 Year.	1-5	5-15	15-25	25-45	45-65	65 and Upw'ds.	Total 1896	Total 1895
Brought over	230	124	47	35	80	97	123	736	791
DISEASES OF RESPIRATORY SYSTEM.									
Laryngitis	1	..	1	..	..	..	..	2	3
Croup .. ..	..	4	..	..	..	..	..	4	2
Emphysema, Asthma .. ..	..	..	..	..	..	..	..	..	1
Bronchitis	55	23	1	..	9	31	40	159	140
Pneumonia	25	16	3	1	13	12	3	73	64
Pleurisy .. ..	..	..	..	..	4	1	..	5	5
Other Diseases of Respiratory System .. ..	..	..	..	..	1	1	2	4	4
DISEASES OF DIGESTIVE SYSTEM									
Dentition .. ..	..	..	..	..	..	..	..	..	..
Sore Throat, Quinsy, Tonsilitis	1	1	..	..	..	..	..	2	..
Diseases of Stomach	3	..	..	..	..	2	1	6	9
Enteritis, Gastro-enteritis	16	4	1	1	1	2	1	26	14
Obstructive Diseases of Intestines	1	..	1	1	..	1	2	6	6
Peritonitis .. ..	..	2	..	2	2	..	..	6	7
Ascites .. ..	..	..	..	..	..	1	..	1	..
Cirrhosis of Liver .. ..	..	..	..	..	1	7	2	10	6
Jaundice, and other Diseases of Liver	2	..	..	..	2	4	2	10	7
Other Diseases of Digestive System	1	..	..	..	..	1	1	3	..
DISEASES OF URINARY SYSTEM.									
Nephritis	1	..	..	..	1	2	1	5	8
Bright's Disease, Albuminuria	2	..	..	..	1	4	3	10	15
Disease of Bladder, or of Prostate .. ..	..	..	..	..	..	..	1	1	2
Other Diseases of the Urinary System .. ..	..	..	..	..	..	1	2	3	3
DISEASES OF REPRODUCTIVE SYSTEM.									
Of Male Organs .. ..	..	..	..	..	..	..	..	..	..
Of Female Organs .. ..	..	..	..	..	1	..	..	1	5
Abortion, Miscarriage .. ..	..	..	..	..	..	..	..	..	3
Puerperal Convulsions .. ..	..	..	..	1	..	..	..	1	..
Placenta Previa, Flooding .. ..	..	..	..	2	1	..	..	3	3
Other Accidents of Child-birth .. ..	..	..	..	1	..	..	..	1	2
DISEASES OF BONES AND JOINTS.									
Caries, Necrosis	1	..	..	..	..	..	..	1	..
Arthritis, Ostitis, Periostitis .. ..	..	..	..	..	..	..	1	1	1
DISEASES OF INTEGUMENTARY SYSTEM.									
Carbuncle, Phlegmon, Cellulitis .. ..	..	..	..	..	..	..	..	..	1
Other Diseases of Integumentary System .. ..	..	..	..	..	..	1	..	1	1
VII.—Deaths from Violence.									
ACCIDENT OR NEGLIGENCE.									
Fractures and Contusions .. ..	..	..	..	..	..	2	2	4	2
Cut, Stab .. ..	..	..	..	..	..	..	..	..	..
Burn, Scald .. ..	..	..	..	..	1	..	..	1	1
Poison .. ..	..	..	..	..	..	..	..	..	..
Drowning .. ..	..	..	2	..	2	..	..	4	3
Suffocation	3	..	..	..	..	..	..	3	5
Otherwise	1	..	1	..	..	1	2	5	4
HOMICIDE.									
Manslaughter .. ..	..	..	..	..	..	..	..	..	..
Murder .. ..	..	..	..	..	..	..	..	..	1
SUICIDE.									
Cut, Stab .. ..	..	..	..	..	..	1	..	1	1
Poison .. ..	..	..	..	..	..	..	..	..	1
Drowning .. ..	..	..	..	..	1	..	..	1	..
Hanging .. ..	..	..	..	..	1	..	..	1	..
Otherwise .. ..	..	..	..	..	..	..	..	..	..
VIII.—Deaths from Ill-defined and not Specified Causes.									
Dropsy .. ..	..	..	1	..	1	..	..	2	..
Debility, Atrophy, Inanition	34	..	..	..	..	..	..	34	57
Marasmus	39	2	..	..	..	..	..	41	50
Mortification .. ..	..	..	1	..	..	..	..	1	5
Abscess .. ..	..	..	..	..	..	..	..	..	1
Hæmorrhage .. ..	..	..	..	..	..	..	..	..	1
Sudden Death (cause not ascertained) .. ..	..	..	..	..	..	..	..	..	..
Other not Specified or Ill-defined Causes .. ..	..	..	1	..	..	..	..	1	3
Total	416	176	60	44	123	172	189	1180	1238

ASTON MANOR.

SUMMARY OF WORK DONE IN THE SANITARY DEPARTMENT
DURING THE YEAR 1896.*Notices Served, and Nuisances, &c., abated during the past Twelve Months.*

Nature of Nuisances.	Notices left on Books Dec. 31st, 1895.	Notices served during 1896.	Notices abated during 1896.	Notices remaining on Books Dec. 31st, 1896.	Houses in connection with Notices served.
Drains requiring cleansing, &c. ...	10 ...	609 ...	609 ...	10 ...	2,234
Drains requiring disconnection between house and sewer ...	1 ...	25 ...	26 ...	— ...	86
Insufficient Drainage ...	— ...	56 ...	54 ...	2 ...	259
Accumulation of Manure ...	— ...	74 ...	72 ...	2 ...	101
Overcrowded houses and workshops ...	— ...	1 ...	1 ...	— ...	1
Filthy houses ...	4 ...	231 ...	228 ...	7 ...	1,012
„ privies ...	3 ...	171 ...	170 ...	4 ...	1,187
„ workshops and bakehouses ...	— ...	63 ...	62 ...	1 ...	128
„ slaughterhouses ...	— ...	2 ...	2 ...	— ...	2
„ milkshops ...	— ...	3 ...	3 ...	— ...	3
Defective yard paving ...	— ...	35 ...	35 ...	— ...	140
Dilapidated buildings ...	7 ...	377 ...	369 ...	15 ...	1,540
Defective eaves and down spouting ...	11 ...	284 ...	290 ...	5 ...	681
Middens, wet and offensive, to alter ...	4 ...	149 ...	146 ...	7 ...	439
Privies and middens requiring conversion into W.C.'s and dry ashpits ...	— ...	16 ...	15 ...	1 ...	59
Insufficient privy accommodation ...	— ...	8 ...	5 ...	3 ...	23
Want of urinals ...	— ...	13 ...	13 ...	— ...	88
Animals kept as a nuisance ...	— ...	99 ...	96 ...	3 ...	99
Water in cellars ...	— ...	9 ...	6 ...	3 ...	14
Houses and W.C.'s without water supply ...	— ...	7 ...	7 ...	— ...	52
Polluted wells ...	— ...	2 ...	2 ...	— ...	7
Houses to cleanse after infectious disease ...	22 ...	665 ...	674 ...	13 ...	665
TOTAL ...	62	2,899	2,885	76	8,820

Houses disinfected by Inspector ...	737
Lots of bedding and clothing disinfected ...	726
Notices sent to Schools of cases of infectious diseases ...	937
Visit of Inspector to slaughterhouses ...	647
„ „ to butchers' and provision shops ...	871
„ „ to workshops and bakehouses ...	459
Samples of water taken to Medical Officer ...	4
Cases reported on to Medical Officer ...	1,008
Observations on chimneys ...	242
Chimneys emitting black smoke over twelve minutes in hour ...	32
Number of milk dealers on the Register ...	400
„ cowsheds „ „ ...	8
Licenses issued for hackney carriages ...	105
„ „ drivers of hackney carriages ...	75
„ „ sale of petroleum ...	20

FOOD AND DRUGS ACTS, 1875-9.

During the twelve months ending Dec. 31st, 1896, I have taken for the purpose of analysis, under the provisions of the above Acts, 229 samples, viz.:

Nature of Articles.	No. of Samples taken.	Genuine.	Adulterated.	Cream Abstracted.	Poor in Quality.	Cautioned by Committee.	Prosecutions.	Fines.			Costs.		
								£	s.	d.	£	s.	d.
Milk	155	130	9	9	7	6	12	15	12	0	5	6	6
Butter	59	46	13	—	—	—	13	31	15	0	6	19	0
Lard	2	2	—	—	—	—	—	—	—	—	—	—	—
Flour	6	6	—	—	—	—	—	—	—	—	—	—	—
Coffee	1	1	—	—	—	—	—	—	—	—	—	—	—
Pepper	1	1	—	—	—	—	—	—	—	—	—	—	—
Bread	1	1	—	—	—	—	—	—	—	—	—	—	—
Cheese	1	1	—	—	—	—	—	—	—	—	—	—	—
Sweets	2	1	1	—	—	—	1	—	—	—	0	6	6
Whiskey	1	1	—	—	—	—	—	—	—	—	—	—	—
Totals	229	190	23	9	7	6	26	£47	7	0	£12	12	0

EXTENT OF ADULTERATION DURING 1896.

MILK :—

7 Samples were poor in quality.
 2 " " adulterated with 5 % of added water.
 1 Sample was " " 8 % " "
 1 " " " " 9 % " "
 1 " " " " 10 % " "
 1 " " " " 12 % " "
 2 Samples were " " 14 % " "
 1 Sample was " " 17 % " "
 2 Samples were deficient of 15 % of cream.
 2 " " " 20 % " "
 1 Sample was " 27 % " "
 3 Samples were " 28 % " "
 1 Sample was " 36 % " "

BUTTER :—

1 Sample contained 65 % of fat foreign to butter.
 1 " " 70 % " " "
 1 " " 75 % " " "
 3 Samples " 80 % " " "
 2 " " 85 % " " "
 5 " " 90 % " " "

SWEETS :—

1 Sample contained 3·5 % of Paraffin Wax.

THE RESULT OF THE PROSECUTIONS WAS AS FOLLOWS :

Milk.—Convictions were obtained in 8 cases and fines inflicted, one at 20/- and costs, five at 30/- and costs, one at 40/- and costs, one at £5 and costs. In 3 cases the summonses were dismissed through their being adjudged as not properly served—the summonses were issued on April 24th, and the hearing came on on May 1st. The solicitor for one of the defendants contended that there were not seven clear days between the day of issue and the day of hearing in accordance with the Act. The Justices held the objection was correct. 1 case was dismissed on the defendant pleading a warranty and paying the costs, but the farmers who supplied the milk were prosecuted, and a fine of 2/- and 13/6 costs inflicted.

Butter.—Of the 59 samples of butter purchased for analysis during 1896, 13 proved to be margarine, and the vendors with one exception were proceeded against under the Margarine Act. Convictions were obtained in 12 cases and fines inflicted, five at 15/- and costs, two at 20/- and costs, three at £2 and costs, two at £5 and costs. One case was taken under the Food and Drugs Acts, but was dismissed on the defendant pleading a warranty. The wholesalesman was prosecuted under the same Act for giving a false warranty, and a fine of £10 and 11/6 costs was inflicted.

Sweets.—This case was dismissed on the payment of the costs, as the kind of sweets had been withdrawn from sale.

BENJAMIN BOLT, INSPECTOR.

SUMMARY OF THE WORK OF THE NIGHT-SOIL DEPARTMENT AND OF
DISINFECTION DURING 1896
AND PREVIOUS TEN YEARS.

Year.	DAY WORK. Dry Ashpits, Ash Tubs and Refuse Tubs.				NIGHT WORK. Ashpits and Privies.			Gross Amount of Sales of Night-soil.	Disinfection of Bedding.	
	No. of emptyings of dry Ashpits.	No. of Loads removed from dry Ashpits.	No. of emptyings of Ash Tubs and Refuse Tubs.	No. of Loads removed from Ash and Refuse Tubs	No. of Middens emptied.	No. of Cart Loads removed.	Average No. of Loads from each.		No. of Lots of Bedding, &c., disinfected.	No. of Articles disinfected.
1896	6,579	5,426	6,309	282	11,026	13,696		£270	1,031	12,677
1895	5,531	5,670	6,472	317	10,940	14,704	1 $\frac{1}{4}$	£310	532	8,323
1894	4,573	4,080	6,072	289	10,948	14,511	1 $\frac{1}{4}$	£385	497	9,317
1893	4,438	3,965	5,050	295	11,280	14,868	1 $\frac{1}{4}$	£396	539	8,912
1892	4,283	4,372	5,686	343	10,698	16,426	1 $\frac{1}{3}$	£445	471	7,001
1891	2,791	3,516	4,384	347	10,428	17,125	1 $\frac{2}{3}$	£482	381	7,425
1890	2,219	3,128	3,742	316	10,004	16,708	1 $\frac{1}{2}$	£528	478	8,721
1889	1,185	1,766	2,880	288	10,357	17,120	1 $\frac{2}{3}$	£520	248	5,063
1888	621	991	2,398	244	9,897	16,878	1 $\frac{1}{2}$	£517	129	2,392
1887	385	629	2,756	254	9,894	16,470	1 $\frac{2}{3}$	£612	122	2,191
1886	166	329	2,887	"	9,535	16,247	1 $\frac{1}{2}$	£638	68	1,315

* Total Tonnage, 21,684.

Total consumed in Destructor, 14,763 tons.

A. TREADAWAY, Superintendent.



BIRMINGHAM :
BUCKLER BROTHERS, PRINTERS, HIGH STREET.

